

WHAT IS CLAIMED IS:

1. A driving method for a Thin Film Transistor (TFT) array, capable of saving power, comprising the steps:
  - implementing an Application Specific Integrated Circuit chip;
  - determining a predetermined mode;
  - dividing a Thin Film Transistor array frame into a plurality of zones according to the predetermined mode, wherein the plurality of zones are grouped into graphic and non-graphic regions; and
  - signaling a control signal by the Application Specific Integrated Circuit to determine the driving type required for each zone according to the plurality of zones grouped.
2. The method of Claim 1, wherein the predetermined mode is a standby mode.
3. The method of Claim 1, wherein the predetermined mode is a graphic mode.
4. The method of Claim 1, wherein the predetermined mode is a video mode.
5. The method of Claim 1, wherein the predetermined mode is dictated by the manufacturer.
6. The method of Claim 1, wherein the graphic and non-graphic regions located on a frame are determined by the manufacturer.

1           7. The method of Claim 1, wherein the driving type in  
2 the graphic region uses a line inversion.

1           8. The method of Claim 1, wherein the driving type in  
2 the non-graphic region uses a frame inversion.

1           9. The method of Claim 1, wherein the step of  
2 determining a predetermined mode is performed by a central  
3 processing unit (CPU).

1           10. The method of Claim 1, wherein the step of  
2 determining a predetermined mode is performed by an  
3 operating system.

1           11. The method of Claim 1, further comprising a step of  
2 signaling the data associated with the plurality of zones to  
3 the ASIC chip after the dividing step